

AMENDMENT TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims

1. (Previously presented) A printing mechanism of a machine of the tobacco processing industry comprising:

a tempering device, structured and arranged to adjust a temperature of ink in at least one of an ink nozzle, ink supply and metering device;

said tempering device comprises at least one of at least one heating device and at least one cooling element, such that said cooling element comprises a cooling plate;

said ink supply, metering device, and ink nozzle being at least partially located on said cooling plate.

2. (Original) The printing mechanism in accordance with claim 1, wherein the machine is a cigarette rod machine.

3. (Canceled)

4. (Previously presented) The printing mechanism in accordance with claim 1, wherein said heating device is located with at least one of said ink supply, metering device, and ink nozzle.

5. (Currently amended) The printing mechanism in accordance with claim 1, wherein said heating element device comprises at least one of a heating cartridge and a heat sensor.

6. (Previously presented) The printing mechanism in accordance with claim 1, further comprising a temperature sensor,

wherein said temperature sensor is positioned one of:

- (a) near at least one of said ink supply, metering device, and ink nozzle; or
- (b) on or in at least one of said ink supply, metering device, and ink nozzle.

7. (Canceled)

8. (Previously presented) The printing mechanism in accordance with claim 1, wherein said cooling element is structured and arranged for a medium to flow through said cooling element.

9. (Canceled).

10. (Previously presented) The printing mechanism in accordance with claim 1, wherein said cooling element comprises a device structured to produce a cooled air flow.

11. (Previously presented) The printing mechanism in accordance with claim 1, wherein said cooling element comprises an eddy current generator.

12. (Original) The printing mechanism in accordance with claim 1, wherein said tempering device comprises a control or regulating unit.

13. (Previously presented) The printing mechanism in accordance with claim 1, wherein the at least one of an ink nozzle, ink supply and metering device comprises an ink nozzle.

14. (Original) The printing mechanism in accordance with claim 13, further comprising a heating cartridge located one of integrally in said ink nozzle or to lie against said ink nozzle.

15. (Previously presented) The printing mechanism in accordance with claim 13, further comprising a temperature sensor located one of in and on said ink nozzle.

16. (Original) The printing mechanism in accordance with claim 13, further comprising a plurality of distributor rollers, a stamp roller, and a pressure roller,

wherein two of said plurality of distributor rollers are arranged to receive ink from said ink nozzle, and said stamp roller and said pressure roller are arranged to guide a paper strip to be printed.

17. (Original) The printing mechanism in accordance with claim 13, further comprising a device to measure ink pressure before discharge from said ink nozzle.

18. (Currently Amended) A process for printing with a printing mechanism that includes a tempering device comprising ~~at least one of at least one heating element and at least one cooling element, which includes a cooling plate;~~ said process comprising:

adjusting a temperature of ink in at least one of an ink nozzle, ink supply and metering device in the printing mechanism via the tempering device;

wherein the adjusting of the temperature of ink comprises adjusting a temperature of the printing mechanism ~~said ink temperature~~ with the cooling plate element.

19. (Original) The process in accordance with claim 18, wherein the printing mechanism is located within a machine of the tobacco processing industry.

20. (Original) The process in accordance with claim 19, wherein said machine is a cigarette rod machine.

21. (Canceled)

22. (Currently amended) The process in accordance with claim 18, wherein the ink temperature is adjusted in the at least one of the ink supply, the metering device, and the ink nozzle of the printing mechanism by ~~the~~ at least one heating element.

23. (Original) The process in accordance with claim 22, wherein the at least one heating element comprises a heating cartridge.

24. (Canceled)

25. (Previously presented) The process in accordance with claim 18, further comprising flowing a medium through the cooling element.

26. (Currently amended) The process in accordance with claim 18, wherein at least some components of the printing mechanism are located at least partially on the cooling plate element, whereby the components are cooled by the cooling plate element.

27. (Previously presented) The process in accordance with claim 18, wherein the at least one cooling element comprises a device producing a cooled air flow, and the ink temperature is adjusted by directing the cooled air flow toward a portion of the printing mechanism.

28. (Original) The process in accordance with claim 18, further comprising controlling or regulating the tempering device through a control or regulation device.

29. (Original) The process in accordance with claim 18, further comprising heating the ink in the ink nozzle.

30. (Original) The process in accordance with claim 18, further comprising detecting a temperature of the ink in the ink nozzle.

31. (Original) The process in accordance with claim 18, further comprising measuring ink pressure before discharge from the ink nozzle.

Claims 32 and 33. (Canceled).

34. (Currently amended) A process for printing a cigarette paper strip in ~~the~~ a machine in accordance with claim 32 of the tobacco processing industry comprising a printing mechanism, said process comprising:

guiding the cigarette paper strip to a the printing mechanism having a tempering device; and

adjusting at least one of a temperature and a viscosity of the ink in the printing mechanism via the tempering device,

wherein the adjusting of the at least one of the temperature and the viscosity of the ink comprises adjusting the temperature of the printing mechanism with a cooling element.

35. (New) The process in accordance with claim 18, wherein the cooling element includes a cooling plate.

36. (New) The process in accordance with claim 35, wherein the cooling plate features channels.

37. (New) The process in accordance with claim 36, wherein a pump is provided for conveying cooling fluid through the channels.

38. (New) The process in accordance with claim 18, wherein the cooling element includes a heat exchanger.

39. (New) The process in accordance with claim 18, wherein the cooling 10 element includes a cold air generator or an eddy current generator.

40. (New) The process in accordance with claim 18, wherein the adjusting of the temperature of ink comprises adjusting the temperature of rollers and cylinders of the printing mechanism with the cooling element.

41. (New) The process in accordance with claim 18, wherein the cooling takes place continuously or periodically.

42. (New) The process in accordance with claim 34, wherein the cooling element includes a cooling plate.

43. (New) The process in accordance with claim 34, wherein the cooling plate features channels.

44. (New) The process in accordance with claim 34, wherein a pump is provided for conveying cooling fluid through the channels.

45. (New) The process in accordance with claim 34, wherein the cooling element includes a heat exchanger.

46. (New) The process in accordance with claim 34, wherein the cooling element includes a cold air generator or an eddy current generator.

47. (New) The process in accordance with claim 34, wherein the adjusting of the temperature of ink comprises adjusting the temperature of rollers and cylinders of the printing mechanism with the cooling element.

48. (New) The process in accordance with claim 34, wherein the cooling takes place continuously or periodically.